RUTT/ETRA VIDEO SYNTHESIZER SYSTEMS

WELCOME TO THE WORLD OF VIDEO SYNTHESIS!
Video synthesis opens the door to a vast new world of dynamic visuals serving functional and artful purposes. It yields major economies in time, labor and materials required for title, graphics and background animation.. Already attracting much attention in commercial TV program and advertising fields, it dramatically expands the horizons of experimental video art.

It realizes the dreams of audio-visual producers for a quicker, more economical way to manipulate TV and film images without resorting to cell animation.

Emerging from the early principles of video image manipulation used for radar in the '40s, expanded in video flight simulators of the '50s and in experimental video art of the '60s, the RUTT/ETRA VIDEO SYNTHESIZER represents engineering and cost-saving breakthroughs bringing this incredible facility within the financial grasp of many video and film producers.

Distributed by MPCS in NYC

RE-4 – A Video Synthesizer $8500.00 [later sold for $12,999.00]
DISPLAY CONTROL UNIT
Two Separate sets of control varying image:
Height: Reduces to thin line; expands inverted image beneath. Rotates horizontally.
Width Varies and inverts. Rotates vertically.
Depth Advances and receeds.
Vert. **Position** Up-down on or off screen.
Horiz. **Position** R-L on or off screen.
Intensity Controls brightness
Horiz. **Center** Moves image through preset patterns, ala words around theatre marquee.
Vert. Center Adjusts vertical axis.

Plus…SCAN RATE switch…DISPLAY 0°/90° rotating image 90°…INT./EXT. SYNC.

ANIMATION CONTROL MODULES
Summing Amplifier Combines functions.
Diode Module Divides waveform & timing ramps.
Ramp Generator Automatic control of animation at preset speed and period of time.
Audio Interface Drives animation with audio, bio-feedback or other external signals.
(2) **Waveform Generators** Produces graphic forms for display or for reshaping and animating images. Controls **frequency, waveshape, duty cycle, amplitude & frequency modulation, sync**.

DISPLAY UNIT (Type A)
Displays 525-line synthesizer images.

RE-4-B Video Synthesizer $16,300 [later priced at $24,999]
Similar to RE-4A, but substitutes Type B Display (1050-line scan) yielding full NTSC resolution in rescanned image for two0inch hi-band videotape or direct telecast.

Manufactured by Rutt Electrophysics, New York City.

In minutes instead of days you can animate images from flat art, a TV camera, videotape or motion picture. The images can be in color or black-and-white, in high contrast or continuous tones. You can also generate within the synthesizer

endless variations of abstract lines, forms and patterns. You can alter all – or parts – of image height, width, depth, shape, position, brightness, and movement. It is also possible for you to rotate images in two-dimensional and three-dimensional space. Your pre-set animation and timing can be rehersed and then repeated automatically. Synthesizers can be equipped to animate many separate graphic elements simultaneously.

Surpassing conventional TV effects generators, the R/E synthesizer generates key visual inserts of any desired shape which you can reshape and animate without moving the original graphic or its pickup camera.

The synthesizer can also be controlled by outside events such as music, speech, bio-physical sensors, etc., reflecting non-visual phenomena in graphic display. Interfaced with a computer, the synthesizer performs lengthy, complex programs in continuous runs for direct broadcast, or to economize on taping and filing time.

Finally: the synthesized images are displayed on high resolution kinescope and picked up by a TV camera to be fed into a videotaping or broadcasting system.

For filming the display, optional accessories eliminate TV raster lines from the filmed image.

Cost-saving breakthroughs put the R/E VIDEO SYNTHESIZER within the financial grasp of many video and film organizations, with these advantages, among others:

1. Major savings of labor, time and materials in producing conventional animation, optical effects and transitions, backgrounds, etc.
2. Endless potentials for new approaches to TV and film commercials, news, sports, weather, educational, artistic and experimental programs and films.